

FACING CHALLENGES AS YOUNG ENGINEERS

Institution of
**MECHANICAL
ENGINEERS**

Murat Islam CEng MIMechE
Chairman, IMechE Lancashire Area
www.linkedin.com/in/muratislam/

02 March 2019

www.imeche.org

Improving the world through engineering



SHOW OF HANDS!

How many of you are...

- aware of Continuous Professional Development?
- using a Personal Development Plan?
- a member or an affiliate of a PEI?



AGENDA

10+ Year Engineering Career

Facing Challenges as Young Engineers

IMechE & Young Member Panels

WHY ENGINEERING?

Engineering is;

- **Fun**
- **Challenging**
- **Stable Career**
- **Versatile**

WHY IMECHE?

IMechE is;

- **Worldwide**
- **Prestigious**
- **Experienced**
- **Volunteering**

10+ YEAR ENGINEERING CAREER

08

- BEng Mechanical Engineering at Karadeniz Technical U.
- Contract: AutoCAD Mechanical Engineer in Turkey

09

- Moved to the UK with Turkish Government Scholarship
- Zero-hour: Hospitality Jobs (ManC, ManU, Aintree, etc.)

10

- MSc Mechanical Engineering Design, UoM
- Temporary: SolidWorks Draughtsman, Chemquip Ltd

11

- 1-year of Research in Mechanical Engineering, UoM
- Contract: Manufacturing Engineer Support at Airbus

12

- Permanent: Design Engineer - Subsea Cable Protection Trelleborg Offshore UK Ltd & later BMP Europe Ltd

15

- PgCert Project Management (ODL), RGU
- Chartered Engineer & IMechE Lancashire

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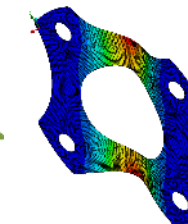
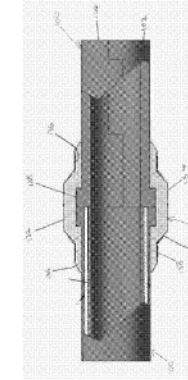
- Patent of “Ducting” for Subsea Cables

17

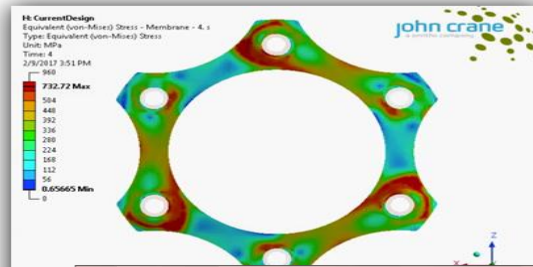
- Permanent: Design Engineer, John Crane UK Ltd
- Volunteering: Vice Chair at the IMechE Lancashire Area

18

- Volunteering: STEM Ambassador
- Volunteering: Honorary Chair at the IMechE Lancashire



DESIGN ENGINEER IN COUPLINGS R&D



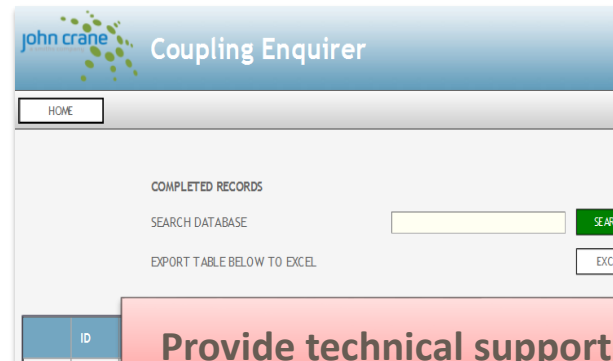
Design and develop power transmission couplings



Predict performance characteristics



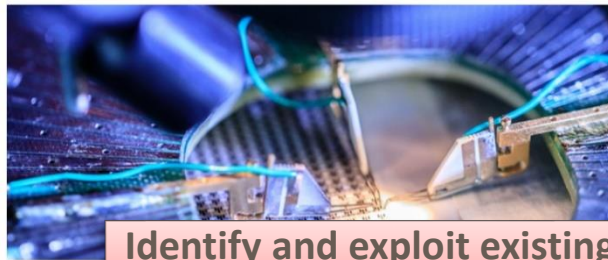
Ensure compliance with standards



Provide technical support



Innovation Pods



5-KEY CHALLENGES FACING YOUNG ENGINEERS

CHALLENGE: 01

CAN I FIND A SCHOLARSHIP?

Apprentice and EngTech awards

Conference and training awards

Industry and special interest group awards

Prestige awards

Undergraduate and postgraduate awards

Vision awards

Volunteering, group and project awards

Young member awards



Contact our Prizes
and Awards Team
awards@imeche.org
[+44 \(0\) 128 471 7887](tel:+44201284717887)

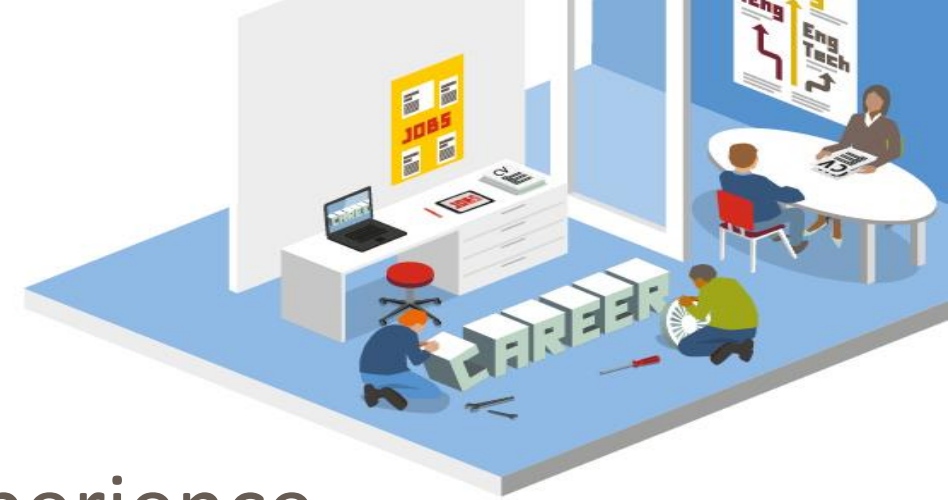
CHALLENGE: 02

SHALL I WORK, OR STUDY FURTHER?

If you work, you make money and experience.

If you study Masters, you have to pay student loans, but your employability and earning potential rises significantly.

If you study PhD, you will become highly specialised and reduce the choice of jobs available to you at the start of your career.



CHALLENGE: 03

HOW DO I GET RELEVANT EXPERIENCE?

Work experience (shadowing)

Internships (fixed-term and unpaid or paid)

Voluntary work (no contract, unpaid)

Temporary work (anytime)

Contract work (fixed-term or zero-hour)

Permanent employment (full benefits)

**AIM IS
TO GET
GOOD
REFERENCES!**



Dear Murat,

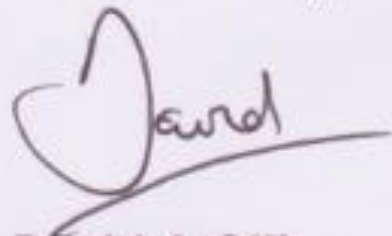
Thank you for all your help in translating for myself and all the other Directors at our recent luncheon with the Directors of Bursaspor.

Your assistance is very much appreciated and I believe you helped again with the Visiting Directors dinner prior to the game.

Should we have a visiting party over from Turkey again, I hope you won't mind us calling on your skills once more. As a gesture of our appreciation I have enclosed a small gift.

Kind regards,

Yours sincerely,



David A Gill
Chief Executive

CHALLENGE: 04

HOW DO I DEVELOP MY CAREER?

Personal SWOT analysis

Setting Development Goals

What do I want to learn/gain?	What do I have to do?	What support and resources will I need?	How will I measure success?	Target date for review?
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Setting Objectives

Short/Medium/Long Term



PERSONAL DEVELOPMENT PLAN



CHALLENGE: 04

HOW DO I DEVELOP MY CAREER?

Networking

Classroom or Online Training

Books / Audiobooks

Peer reviews, Mentoring and Coaching

Shadowing experienced people

Lectures, Seminars or Conferences



PERSONAL DEVELOPMENT PLAN



CHALLENGE: 04

HOW DO I DEVELOP MY CAREER?

Learn from great mentors!

“That which does not kill us makes us stronger.” — Nietzsche

“Everything in the universe is within you. Ask all from yourself.” – Rumi

“Luck is what happens when preparation meets opportunity.” — Seneca

“Innovation comes from people who take joy in their work.” — Deming



CHALLENGE: 05

HOW DO I ESTABLISH MY PERSONAL BRAND?

Skills & Expertise

Affiliations

Publications

Track Record

Presentations

Online Presence

BE

helpful
patient
authentic
remarkable
different
everywhere
responsible
available
consistent
exciting
visible
memorable
original
yourself



**ABOUT
IMECHE**

**Institution of
MECHANICAL
ENGINEERS**

Represents and promotes the interests of engineering and engineers globally

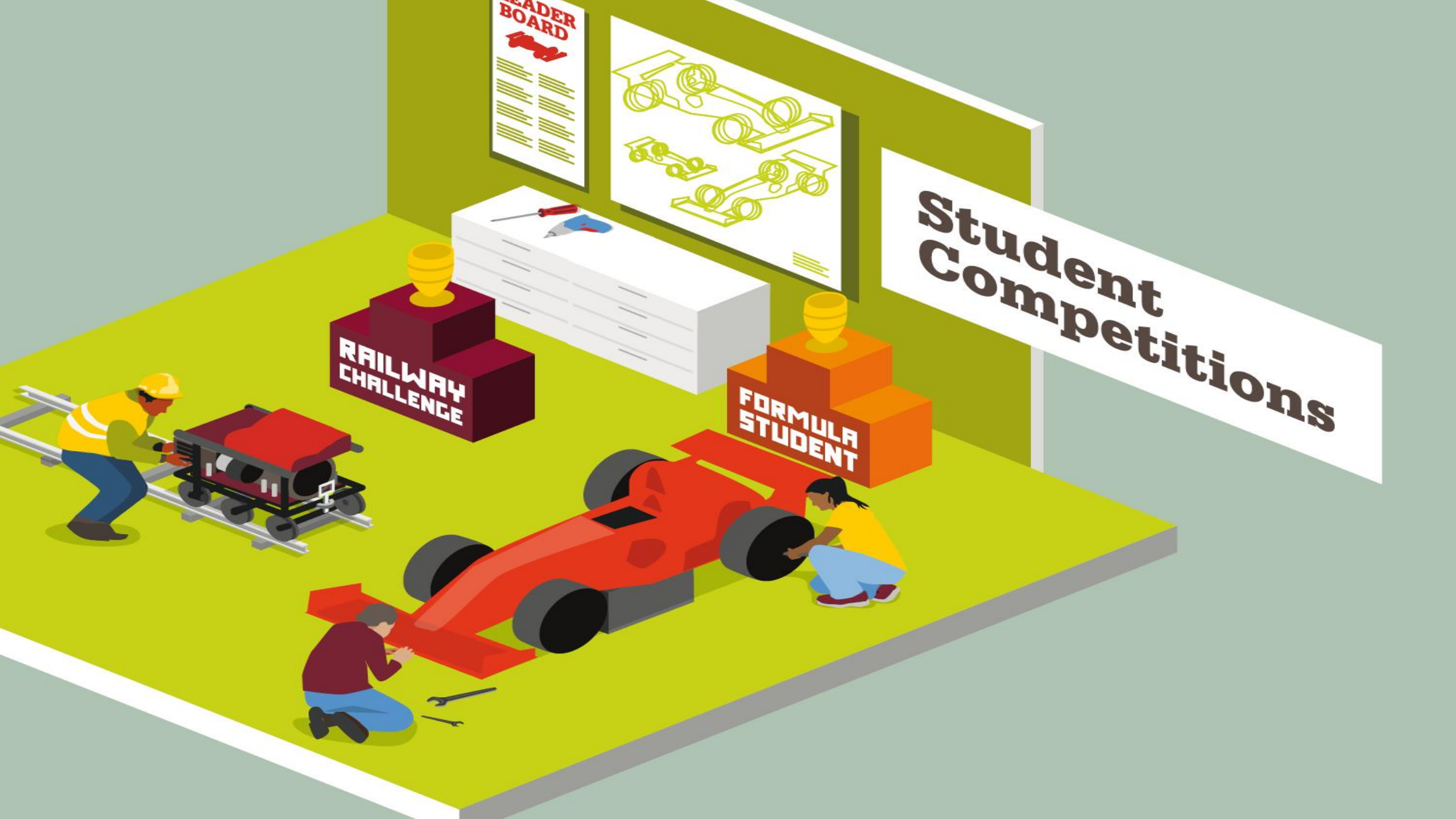
The fastest growing engineering institution in the UK

Licensed by Engineering Council to award EngTech, IEng and CEng registration

Supports all disciplines of the mechanical engineering community

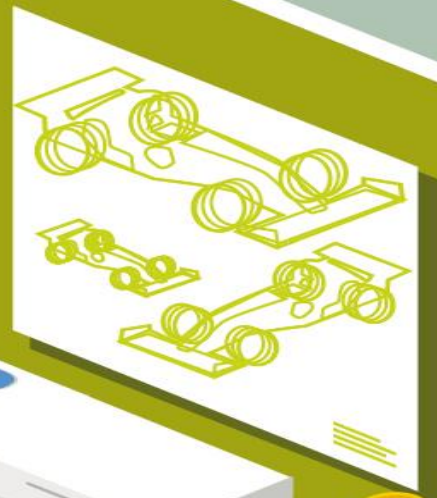
Provides learning and development support at every stage of your career

[SIGN UP AT IMECHE.ORG/UNI](https://www.imeche.org/uni)



LEADER BOARD

1	John Smith	100
2	Emily White	95
3	Michael Brown	90
4	Sarah Green	85
5	David Black	80
6	Jane Grey	75
7	James Blue	70
8	Olivia Pink	65
9	William Yellow	60
10	Ava Purple	55



Student Competitions

RAILWAY CHALLENGE

FORMULA STUDENT

STUDENT COMPETITIONS

Getting involved at your university:

Formula Student

Railway Challenge

Design Challenge

Aerospace Challenge

Unmanned Aircraft Challenge

★ **Speak Out For Engineering**
Global Engineering Debate
Scholarships and Awards



SIGN UP AT [IMECHE.ORG/UNI](https://imeche.org/uni)



CAREERS ADVICE AND SUPPORT

Industry information

Careers advice

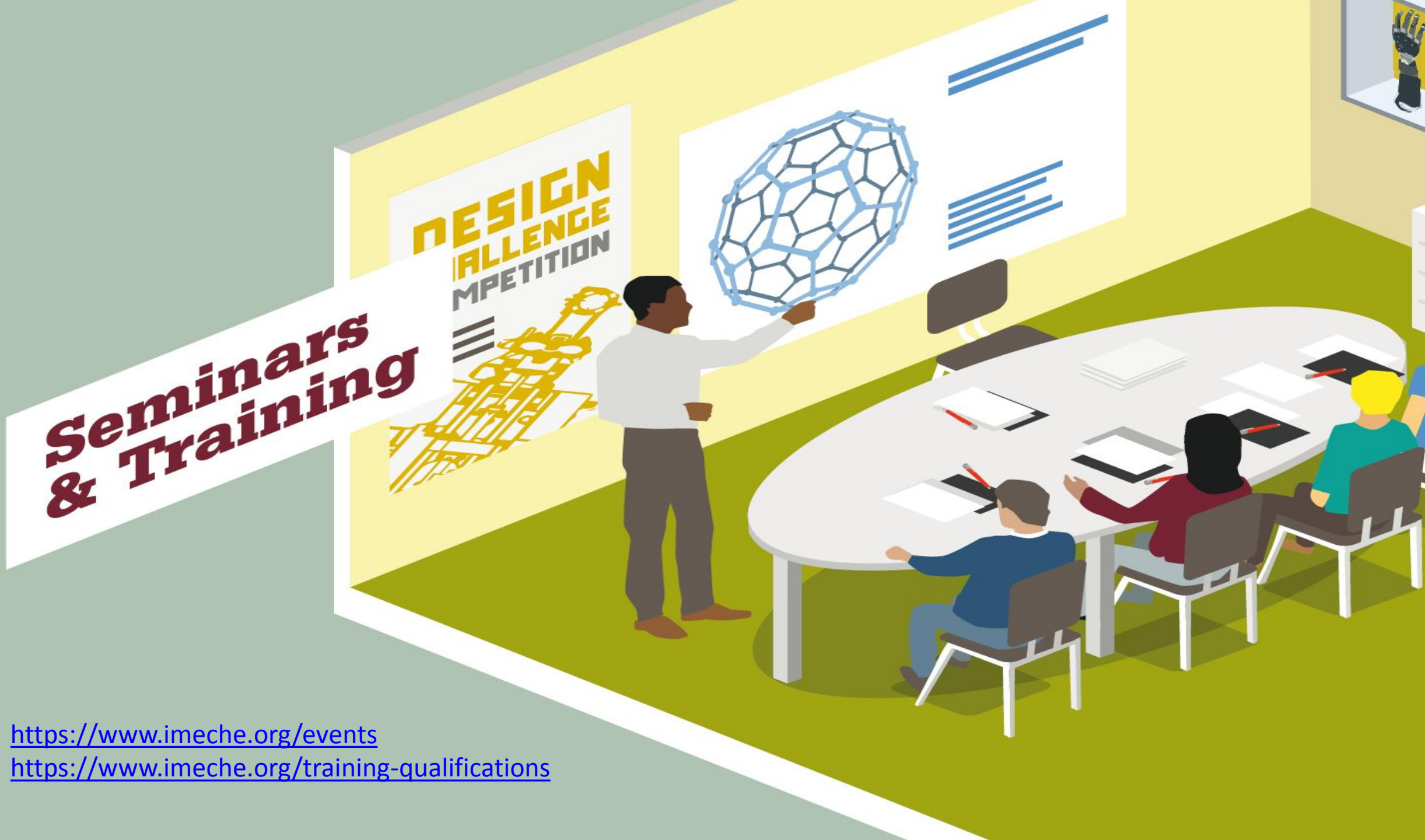
Engineers' video profiles

Job search advice

Job application and process guidance

SIGN UP AT [IMECHE.ORG/UNI](https://imeche.org/uni)





<https://www.imeche.org/events>

<https://www.imeche.org/training-qualifications>



Library & Online Resources

Library enquiries

✉ library@lmeche.org

☎ +44 (0)20 7973 1274

**LITERATURE
REVIEW &
LIST OF REFERENCES**



JOIN YOUR PROFESSIONAL INSTITUTION **THE FIRST STEPS TO PROFESSIONAL REGISTRATION.**

International recognition of your competence

Career enhancement, creating opportunities

Increased earning potential

Ongoing development

Be part of a professional Institution

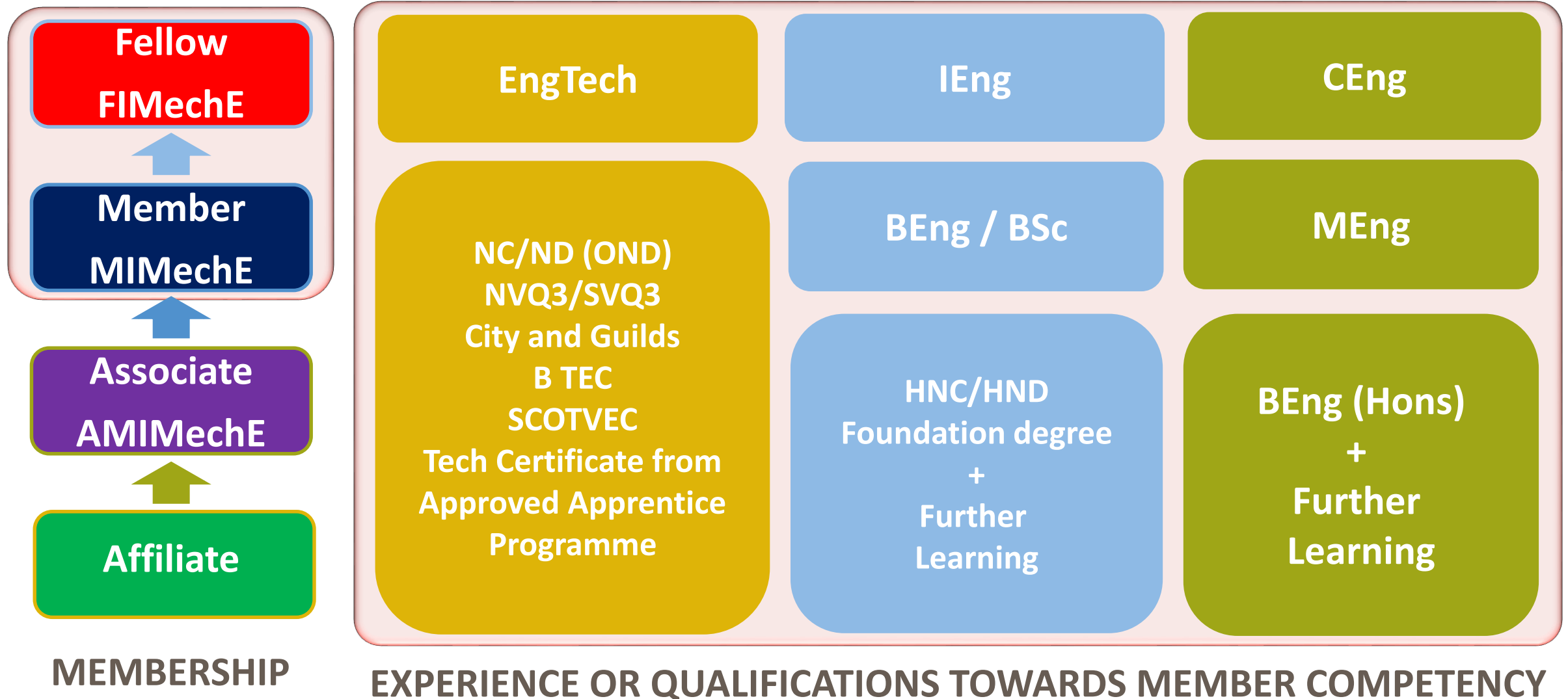
Gain access to life-long learning from the IMechE

Professional credentials

Ruth Shilston, CEng MIMechE
Chair IMechE Young Members Board 2013



FORMAL MEMBERSHIP & QUALIFICATIONS



YOUNG MEMBER NETWORKS

Member networks around the world

Institution staff and local volunteers of students and post-graduates working together

Activities across a broad spectrum of industries

Hosting technical and social events, working on engineering initiatives, and raising the profile of engineering

Provide great networking and volunteering opportunities

Young Members' Board



GET ACTIVE WITH IMECHE

As an Affiliate you can get involved:

Be part of a Professional Network

Join a local Young Member Panel / Student Chapter

Join in events and STEM initiatives

Meet with fellow engineers and future employers

Share experience, help to build your knowledge and support others

Build soft professional skills

SIGN UP AT [IMECHE.ORG/UNI](https://imeche.org/uni)

NORTH WEST REGION YOUNG MEMBER PANELS

<https://nearyou.imeche.org/near-you/UK/North-Western>

GMYMP [/greater-manchester-young-member-panel](#)

NLYMP [/north-lancashire-young-member-panel](#)

SLYMP [/south-lancashire-young-members-panel](#)

SCYMP [/south-cumbria-young-member-panel](#)

West Cumbria Young Members Panel [/WCYM](#)

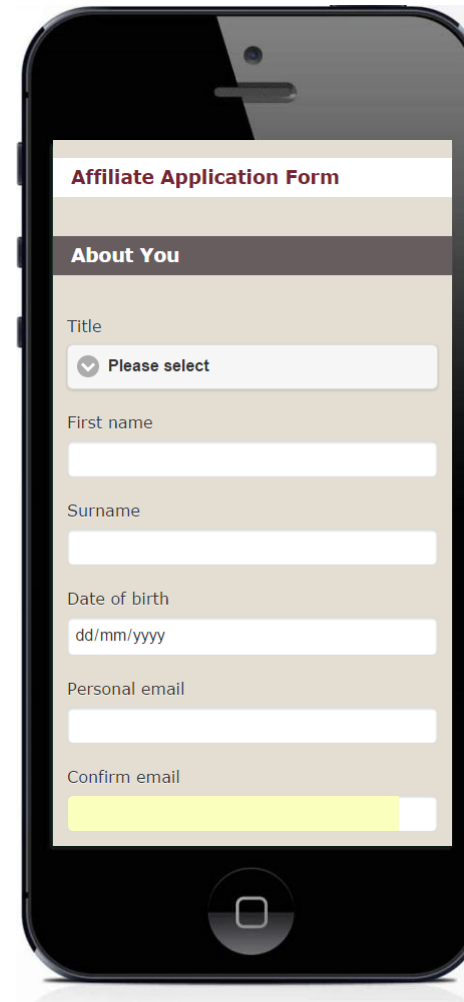
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AFFILIATE MEMBERSHIP HOW TO APPLY.

Sign up at;
www.imeche.org/uni

**MEMBERSHIP &
REGISTRATION**
JOIN US AND BE PART OF A
GLOBAL NETWORK OF OVER
120,000 EXCEPTIONAL
ENGINEERS IN 140 COUNTRIES.



The image shows a black smartphone with a white screen displaying an 'Affiliate Application Form'. The form has a title bar 'Affiliate Application Form' and a section header 'About You'. Below this, there are several input fields: 'Title' with a dropdown menu showing 'Please select', 'First name', 'Surname', 'Date of birth' with a placeholder 'dd/mm/yyyy', 'Personal email', and 'Confirm email' with a yellow highlight bar. The phone is shown from a slightly angled front view.

Complete the
application form



Check your inbox



Click on the
confirmation link



Look out for the
election email

THANK YOU

Murat Islam CEng MIMechE
Chairman, IMechE Lancashire Area

Institution of
**MECHANICAL
ENGINEERS**

www.linkedin.com/in/muratislam/

www.facebook.com/imechelancashire/

nearyou.imeche.org/near-you/UK/North-Western/Lancashire-Area

For more information on professional registration please contact:

Emma Guy – Business Development Manager, IMechE North West Region

e_guy@imeche.org

www.imeche.org

Improving the world through engineering